### PHL277: Ethics of Data

# **Course Description**

This course surveys the fundamental ethical problems raised by the widespread collection of personal data and its use in algorithmic decision-making. We will discuss privacy, algorithmic discrimination, and various other puzzles stemming from the application of machine learning to everyday decision-making.

# **Teaching Team**

Instructor: Steve Coyne (<u>steven.coyne@mail.utoronto.ca</u>) – he/him

*Drop-in Hours*: Wednesdays from 4:30-5:30pm in JHB 420, starting January 15. Most days, I'm also happy to hang out for a few minutes after class. If neither of these times work, send me an email and we can arrange to meet at some other time.

*E-mail:* For written communication, please contact me via e-mail (and not Quercus, which I don't regularly check.) Make sure to identify the course (PHL277) in the title of your e-mail, because I teach multiple courses. I make every attempt to respond to administrative questions (e.g. about course registration, extensions, etc) within one working day. I'm also happy to answer quick, specific questions about course and assignment content by e-mail but it may take me up to several days to get back to you.

Teaching Assistants: Andrew Doppenberg (<u>andrew.doppenberg@mail.utoronto.ca</u>) and Alex McArthur (<u>alex.mcarthur@mail.utoronto.ca</u>)

Office hours: They will have office hours around the time of the assignments.

*E-mail:* Please only contact your TA by e-mail for administrative questions (about tutorial) and if you have questions about the marking of assignments. You should bring questions about the course material to tutorial and office hours. Short questions can also be directed to Steve's e-mail.

## Course Flow

This is an in-person course. We meet on Wednesdays from 6:10-8PM in SF 3202. You should regularly attend lecture. Though I will post slides before each lecture (except the first) and an audio recording of the lecture by the next morning, these recordings are intended only to allow students who already attended the lecture to double check details and to provide some coverage for students who were prevented by emergencies from coming to lecture. They are not a good long-term substitute for attending lecture.

You will have tutorials on Thursday starting January 16 with Andrew or Alex. You must attend the tutorial that you are registered for. In tutorials, you will review course material, evaluate the arguments and positions we have considered, and apply them to real life situations.

# Readings

We will be reading a mix of classic and contemporary philosophical papers relevant to data ethics. All readings will be accessible through Quercus or online library access.

### **Student Success**

Like all philosophy courses, our course material is challenging and the standards on assignments and tests are high. But I want you to profit from the course and to succeed in it. You are very welcome to come and chat with me after class or during my office hours. I'm happy to answer questions or repeat points made in lecture, and more generally talk with you about how your semester is going (or how the Raptors are doing).

## Evaluation

<b>Course Component</b>	Percentage of Grade	Date(s) due
Test	23%	February 5
Assignment 1	23%	February 23
Assignment 2	12%	March 23
Final Exam	35%	Sometime in final exam period
Individual Participation	6%	Throughout the course
(tutorial)		
Groupwork Participation	1%	Throughout the course
(tutorial)		

Note that the assignments should be submitted through Quercus through the corresponding links under 'Assignments'. Please submit all assignments in .doc, .docx, or .pdf – not pages or any other format.

*Test:* You will complete a short (60 minute) closed-book test in lecture – a combination of multiple choice, short answer and long answer questions. It will cover both the readings and lectures 1-4.

Assignment 1: You will complete a written assignment with some choice of questions, roughly 1000 words in total.

Assignment 2: Working in groups, you will apply the ideas from your first written assignment to answer a real-world problem in data ethics drawn from our Sandbox collaboration with UNICEF. You will create a slide deck (8-10 slides) and record a short video presenting it.

*Final Exam:* You will complete a two-hour closed-book final exam – a combination of multiple choice, short answer and long answer questions. It will cover both the readings and anything we cover in lectures 5-12.

*Groupwork participation:* You will earn 1% for your participation in groupwork when in tutorial. As long as you come to a few tutorials and are always participating in groupwork when you do come to tutorial, you will receive full credit.

Individual Participation: You are required to make contributions to verbal discussion at six of your tutorials, worth 1% each (up to a maximum of 6%). Your contribution should show some engagement with the material we are discussing or (better yet) one of your classmates' prior points. This might take the form of a developed question, an objection, or so on. Requests to repeat material, repetitions of points by other students, or questions about class mechanics don't count for points. Please observe the usual norms of class etiquette. Be civil, make sure you raise your hand before making a contribution, and wait for me to acknowledge you and give you the floor.

Your TA will be keeping track of your contributions. Note that you can only receive credit for a maximum of one contribution per tutorial, and you will only receive credit for that contribution if you are present for the whole tutorial in question (so don't make your point and then leave right after, please). There will be no opportunity for alternative participation credit apart from very rare cases – e.g. verified multi-week absences and verified accessibility considerations that prevent participation. You are

responsible for making sure that you contribute throughout the semester (e.g. if you don't participate at all in tutorials 1-4, contribute in tutorials 5-7, and then are absent from tutorials 8-10 you will not receive an opportunity for more credit).

Your TA will do their best to hear from a variety of voices during tutorial. Occasionally you might have a point that we do not have time to discuss, or someone else gets to your point before you do — we know this can be frustrating, but unfortunately these are unavoidable limitations on discussions in a medium size class. Try to get in early and have back-up points planned!

*Bonus Participation Marks:* One or two bonus points to final grades may be awarded to students who contribute to tutorial discussion in an exceptionally active, highly thoughtful manner.

# **Assignment Policies**

Late Penalties: Without an extension or an accommodation, late assignments will incur a 1% penalty for every day that they are late, up to a maximum of 7%. After 7 days late, they will not be accepted. Very late assignments may not receive comments.

Extensions: For an extension on an assignment, get in touch with your TA before the deadline. We are aware that students often run into unexpected difficulties, and as such, as long as you can provide a plausible reason for why you need an extension, the extension is of reasonable length, and you ask for it reasonably in far advance of the deadline, we will likely grant it.

Accommodations: If you require an accommodation for a test or written assignment that you have missed because of an illness, severe personal crisis, etc, please get in touch with Steve (steven.coyne@mail.utoronto.ca) as soon as possible after the deadline. I may refer you to the department undergraduate advisor to assess your case for accommodation. I will generally expect you to have completed a verification of illness form or declaration of absence on ACORN in order to be eligible for an accommodation.

There will be one opportunity to rewrite a missed test in the same form, roughly one week after the missed test. Any further opportunities to rewrite the test will take a different form (likely an oral examination).

Regrade Policy: If you have questions about how your assignments or tests are graded, please visit your TA at their office hours or contact them by e-mail. If you still disagree with your TA's assessment of your test or assignment after talking with them, you can write Steve to ask for a regrade. Please bear in mind that your grade may go up or down.

*Note:* The 'total' column in the grades section on Quercus does not reflect your current or total grade in the course.

# Accessibility

If you have a disability or health consideration that may require accommodation, please get in touch with me and Accessibility Services (https://studentlife.utoronto.ca/department/accessibility-services/).

### Course Conduct and Academic Integrity

I encourage you to work together in this course. You will profit more from the course if you study together, discuss your ideas for your essays with one another, and critique one another's essays once you

have written them. However, as a matter of academic integrity, you must follow these rules (as well as any others in our university's academic integrity policy, available at <a href="https://www.academicintegrity.utoronto.ca/">https://www.academicintegrity.utoronto.ca/</a>):

- 1) You are expected to be the author of your own work. In groupwork, the group is expected to be the author of the work.
- 2) The use of translation software (apart from individual words or short phrases) or the use of large-scale language models (e.g. ChatGPT) is not permitted.
- 3) Any word-for-word use of another person's phrasing (including my own) should be put in quotation marks or set out as a distinct quotation paragraph with a page number or lecture citation (e.g. "(Coyne, Lecture 5)").
- 4) Any use of another person's phrasing or ideas, even if you do not use their exact words, should be given a page number citation. (e.g. "Friedman argues that the social responsibility of a firm is to increase its profits. (Friedman, 23)"). You should be particularly vigilant about this if you choose to use external sources apart from the course readings or lectures. If you use any external sources, you must provide a bibliography with enough information for the reader to find it.

If you have any questions about these rules, or other elements of the university academic integrity policy, please contact me by e-mail *before* you submit your assignment (<a href="mailto:steven.coyne@mail.utoronto.ca">steven.coyne@mail.utoronto.ca</a>). I am more than happy to answer them.

Out of respect for your intellectual work and fairness to the class, I take academic integrity very seriously and make strenuous efforts to verify that my students are respecting it. I forward all suspected violations of academic integrity to administration, who may impose a serious penalty on you.

Normally, students will be required to submit their course essays to the University's plagiarism detection tool for a review of textual similarity and detection of possible plagiarism. In doing so, students will allow their essays to be included as source documents in the tool's reference database, where they will be used solely for the purpose of detecting plagiarism. The terms that apply to the University's use of this tool are described on the Centre for Teaching Support & Innovation web site (<a href="https://uoft.me/pdt-faq">https://uoft.me/pdt-faq</a>). If you do not wish to submit your work to the tool, that is fine, but you will be required to meet with me to discuss and answer questions about your work.

## Course Schedule

Some of the readings may change, subject to course flow and class interest.

Part 1: Data Collection		
Week 1 – January 8 Introduction to Ethics	Daniel Solove, "Nothing to Hide Argument"	
Week 2 – January 15 Privacy – Value Theory	<ul> <li>Derek Parfit, Reasons and Persons (excerpt)</li> <li>James Rachels, "The Value of Privacy"</li> </ul>	
Week 3 – January 22 Privacy – Rights	<ul><li>J.J. Thomson, "The Right to Privacy"</li><li>Thomas Scanlon, "Reply to Thomson"</li></ul>	
Week 4 – January 29	Rima Basu, "The Value of Forgetting"	

The Right to be Forgotten; Privacy Policy	<ul> <li>Jessica Morley et al, "Ethical Guidelines for COVID-19 tracing apps"</li> </ul>
Week 5 – February 5 Test 1 / Data Ownership	<ul><li>Test (60 minutes, 6:10-7:10)</li><li>No readings</li></ul>
Week 6 – February 12 Human Research	<ul> <li>TBD on informed consent</li> <li>A Wertheimer, F.G. Miller, "Payment for research participation: a coercive offer?"</li> </ul>
	<ul><li>Reading Week: February 17-21</li><li>Assignment 1 due February 23</li></ul>
Part 2: Algorithmic Decision-Ma	king
Week 7 – February 26 Algorithmic Transparency	Kate Vredenburgh, "The Right to an Explanation"
Week 8 – March 5 Algorithmic Discrimination (1)	<ul> <li>Kacper Libbert-Rasmussen, "The Badness of Discrimination"</li> </ul>
Week 9 – March 12 Algorithmic Discrimination (2)	<ul> <li>Jeff Larson et al, "How we Analyzed the COMPAS     Recidivism Algorithm"     (https://www.propublica.org/article/how-we-analyzed-the-compas-recidivism-algorithm)</li> <li>Deborah Hellman, "Measuring Algorithmic Fairness"</li> </ul>
Week 10 – March 19 Statistical Evidence and the Law	<ul> <li>Sarah Moss, "Knowledge and Legal Proof"</li> <li>Assignment 2 due March 23</li> </ul>
Week 11 – March 26 Algorithmic Legitimacy	Seth Lazar, "Governing the Algorithmic City"
Week 12 – April 2 Catch-up / Review	• TBD